# **Chapter 3: Lifestyles**

The lifestyle choices that we make are associated strongly with health and wellbeing outcomes in terms of both mortality and morbidity. Health damaging behaviour such as smoking, poor nutrition, low levels of physical activity, and alcohol or drug misuse is not only a causal risk factor in a wide range of diseases including the three big killers of cancer, heart disease and stroke, but also often vary between different socio-economic groups, driving inequality in health as a result. This chapter examines lifestyle behaviours of the population of Thurrock. It includes sections on smoking, eating habits, physical activity, drug and alcohol misuse and breastfeeding.

# 3.1 Smoking

Smoking continues to be the leading preventable cause of death in England, as in the rest of the developed world, making Tobacco Control a key priority for Public Health in general for some time.

Tobacco is the only legal product in the UK that when used correctly leads to the death of its users. Smoking has been linked to 20 causes of death. It has been estimated that in England, 364,000 patients are admitted to NHS hospitals each year due to diseases caused by smoking. This translates into 7,000 hospital admissions per week or 1,000 per day (ONS, 2002). One in two long-term smokers die prematurely as a result of consuming tobacco. Half of these die in middle age. Recent estimates show that approximately 114,000 people in the UK are killed by smoking every year, accounting for one fifth of all UK deaths.<sup>1</sup> Most die from one of the three main diseases associated with cigarette smoking: lung cancer, chronic obstructive lung disease (bronchitis and emphysema) and coronary heart disease. Deaths caused by smoking are five times higher than the combined total of all deaths caused by traffic accidents, poisoning and overdose, alcoholic liver disease, other accidental deaths, murder and manslaughter, suicide and HIV infection.<sup>2</sup> Half of all teenagers who are currently smoking will die from diseases caused by tobacco if they continue to smoke. One quarter will die after 70 years of age, one guarter before, with those dying before losing on average 21 years of life. It has been estimated that between 1950 and 2000, six million Britons and 60 million people worldwide have died from tobacco related diseases.

In additional to mortality, smoking has been linked to 50 different causes of morbidity. Many medical conditions associated with smoking, while not fatal, may cause years of debilitating illness. Conditions that smokers are at greater risk from include angina (20 times the risk), back pain, cataracts, depression, type 2 diabetes, hearing loss, impotence, multiple sclerosis, stomach ulcer, rheumatoid arthritis

• Smoking is also extremely significant in terms of addressing health inequalities. Smoking prevalence is not distributed in a uniform way across all groups in the UK. It has long been established that smoking prevalence is much higher in poorer social classes than more affluent ones. As a result, smoking has been identified as the biggest single cause of inequalities in death rates between rich and poor in the UK. It accounts for over half of the difference in risk of premature death between social classes<sup>3</sup>



## 3.1.1 Adult Smoking Prevalence

Fig 3.1

Source:www.erpho.co.uk

Figure 3.1 shows the overall adult smoking prevalence in Thurrock for 2009/10 (by percentage of the adult population aged 18 and over who smoke) compared to the England mean and the CIPFA comparator local authorities. As figure 3.1 shows, Thurrock's overall adult smoking prevalence is significantly greater than both England's and the East of England.

Thurrock has a smoking prevalence slightly lower than the mean for its CIPFA comparator group, however because the 95% confidence intervals for Thurrock's smoking prevalence overlap with all of its CIPFA comparators, we cannot conclude with 95% confidence that Thurrock's smoking prevalence is statistically significantly different to any of its comparator local authorities.

### 3.1.2 Smoking Prevalence within Thurrock

Smoking prevalence is not distributed evenly within Thurrock. Figure 3.2 shows the adult smoking prevalence by Middle Super Output Area (MSOA) for Thurrock, as measured by the 2008 East of England Lifestyle survey. This is the most up to date data that is available for smoking prevalence by MSOA. This shows the highest prevalence of smoking in the Grays, Tilbury and St.Chads, Tilbury Riverside and parts of Stanford East and Corringham Town.



Source: East of England Lifestyle Survey 2008.

Figure 3.2 shows adult smoking prevalence in Thurrock from the East of England Lifestyle Survey (2008) at MSOA level by Index of Multiple Deprivation (IMD 2010) quintile.

As figure 3.2 shows, smoking prevalence is correlated with deprivation. The prevalence of smoking of the population aged 16 plus in the most deprived quintile (Q5) is approximately two and a half times that the population living in the least deprived quintile (Q1). This is significant, as differences in smoking prevalence between affluent and deprived communities are this single biggest cause of health inequalities.





Source: NHS South West Essex Public Health Directorate (2011)

The confidence intervals on figure 3.3 also show that smoking prevalence in the 20% most deprived MSOAs within Thurrock (deprivation quintile 5) are significantly greater than deprivation quintile 4 (the next most deprived) and Thurrock as a whole. Smoking prevalence in deprivation quintiles three and four are not significantly different, but are statistically significantly less than Thurrock's most deprived quintile but significantly greater than Thurrock's overall prevalence. Thurrock's most affluent 40% of adults have smoking prevalence statistically significantly less than Thurrock's than Thurrock's overall prevalence, with the 20% most affluent having a smoking prevalence significantly less than the next most affluent quintile. (Deprivation Q2).

In order to improve health across the Borough, services need to reduce smoking prevalence in all MSOAs. However, in order to reduce health inequalities within Thurrock, services need to be commissioned that reduce the prevalence of smoking in the more deprived MSOAs at a faster rate than the more affluent ones.

This will require a greatest focus of stop smoking service provision on MSOA in deprivation quintile 5, with additional support for quintiles 3 and 4.

# 3.1.3 Access to Smoking Cessation Services by total population (aged 16+), by deprivation quintile.

Figure 3.4 shows to rate of access to NHS commissioned stop smoking services per head of population aged 16+ broken down by deprivation quintile. 'Access' is defined as a smoker who uses an NHS stop smoking service and sets an agreed date when they will quit smoking through the service. As the previous section highlighted the differences in prevalence of smoking between affluent and deprived communities, it is important that NHS stop smoking services target larger numbers of smokers from our more deprived communities than our affluent ones, if we are going to reduce health inequalities. As figure 3.4 shows, the rate of access to stop smoking services per head of population increases significantly by deprivation quintile, with the rate of access of smokers per head of population in deprivation quintile 5 (the most deprived), being approximately three times that in deprivation quintile 1 (the least deprived).



Fig 3.4

Source: NHS South West Essex Public Health Directorate (2011)

The rate of access of smokers per head of population (x1000) in MSOAs in deprivation quintile 5 is significantly greater than all other MSOAs and Thurrock as a whole (at 95% confidence). There is no significant difference in rate of access of smokers per head of population (x1000) between smokers living in MSOAs in deprivation quintiles 2 and 3.

However rates of access for these quintiles are significantly greater than for MSOAs in the most affluent quintile and significantly less than MSOAs in deprivation quintile 4. The increasing rate of access per head of population across affluent to deprived MSOAs is likely to be largely a product of the fact that there are is a higher prevalence of smokers in more deprived MSOAs compared to more affluent ones.

# 3.1.4 Access to Smoking Cessation Services by estimated smoking population by deprivation quintile.

Figure 3.5 shows the rate of access per smoker to NHS commissioned stop smoking services per estimated smoking population x 1000, by deprivation quintile and for Thurrock over all. This demonstrates how successful our stop smoking services are at attracting individual smokers as a rate of the total population of smokers living in areas of differing affluence and deprivation within Thurrock.



Fig 3.5

Source: NHS South West Essex Public Health Directorate (2011)

As figure 3.5 shows, the most deprived 20% of MSOAs in Thurrock (quintile 5) as a rate of access per total estimated smoking population that is significantly greater than Thurrock's overall rate of access per estimated smoking population and the rate of access of smokers within deprivation quintiles 4 and 3. We can be confident of this with 95% statistical significance. However, the rate of access per smoker in the 40% most affluent MSOAs is also significantly greater than deprivation quintile 3 and not significantly different from deprivation quintiles 4 and 5.

As such current services are failing to target a greater proportion of smokers from the most deprived communities in Thurrock – something that is required if health inequalities are going to be reduced.



Fig 3.6

Source: NHS South West Essex Public Health Directorate (2011)

Figure 3.6 shows rate of access to NHS stop smoking services by estimated smoking population of each of the Thurrock wards. If we wish to reduce health inequalities we caused by differences in smoking rates between affluent and deprived wards, we need to see a greater rate of access to stop smoking services in our deprived wards compared to our affluent ones. In terms of access to stop smoking services and health inequalities, figure 3.6 looks positive. Our highest rate of access per estimated smoking population is in the wards of Tilbury Riverside and Thurrock Park, Tilbury St. Chads and Belhus, all of which are in the most deprived quintile. Equally the affluent areas of Orsett and Corringham and Fobbing have lower rates of access.

#### 3.1.5 Smoking Quitter Success Rate

Figure 3.7 shows the success rate that smokers from the five Thurrock MSOA deprivation quintiles have in achieving to stop smoking through a Thurrock NHS stop smoking service and remain stopped at four weeks. (i.e. the *conversion rate* of smokers setting a quit date to a four week quit).





Source: NHS South West Essex Public Health Directorate (2011)

NICE Guidance<sup>4</sup> states that all NHS stop smoking services should achieve a minimum 35% conversion percentage of smokers setting a quit rate to those remaining quit at four weeks, to be considered of adequate quality. As figure 3.7 shows, smokers from all five deprivation quintiles achieve a quit success rate at four weeks above 35%, however the success rate of quitters largely decreases as deprivation increases, with smokers in the 40% most deprived MSOAs in Thurrock having a quit success rate less than the Thurrock over all figure, and smokers the 60% most affluent MSOAs having a quit success rate at four weeks greater than the Thurrock over all. This mirrors national research which shows the smokers from deprived communities find it more difficult to quit smoking than those from affluent ones.<sup>5</sup>

# 3.1.6 Quit success at four weeks as a percentage of estimated smoking population.

Figure 3.8 shows the rate of smoking quitting at four weeks through NHS commissioned services per estimated total adult (16+) smoking population (x1000) of Thurrock MSOAs across the five quintiles of deprivation, and for Thurrock as a whole.





Source: NHS South West Essex Public Health Directorate (2011)

Because the confidence intervals for the quit rates of each deprivation quintile overlap, we cannot conclude with 95% confidence that there is any statistically significant difference in smoking quit rate through NHS commissioned services in Thurrock as a percentage of estimated smoking population between any of the deprivation quintiles. This would suggest that whilst NHS stop smoking services are successful at helping some smokers quit, they are failing to impact on health inequalities in Thurrock, as smokers in our most deprived communities are not quitting smoking at a rate greater than our affluent ones.



Source: NHS South West Essex Public Health Directorate (2011)

Figure 3.9 shows the four week quit rate through NHS stop smoking services per estimated smoking population by ward. In order to reduce health inequalities caused by differences in smoking prevalence between affluent and deprived wards, ideally we would like to see the highest smoking quit rates per smoking population coming from the most deprived wards.

Like the access rates per smoking population shown in figure 3.6, figure 3.9 gives a mixed picture. Belhus, Aveley and Uplands which is in the most deprived quintile also has some of the largest quit rates in Thurrock, and Orsett which is an affluent area have lower than average quit rates per smoking population.

However, West Thurrock and South Stifford, Grays Riverside and Tilbury St. Chads which are areas of high deprivation have only median quit rates, and Little Thurrock and Blackshots and Chadwell St. Mary which are areas of high deprivation have quit rates per estimated smoking population which are lower than the median for Thurrock. In order to reduce health inequalities, commissioners need to increase the focus on these areas in order to improve access and quit rates from their smoking populations.

Fig 3.9

# 3.1.7 Smoking in Pregnancy

Smoking during pregnancy is related to many adverse effects on health and reproduction, in addition to the general health effects of tobacco. A number of studies have shown that tobacco use is a significant factor in miscarriages among pregnant smokers, and that it contributes to a number of other threats to the health of the foetus.<sup>6</sup> Smoking during pregnancy can lead to a plethora of health risks to both the mother and the foetus including early rupture of membranes, Placenta Previa, ectopic pregnancy and placental abruption.<sup>7</sup> Smoking nearly doubles the risk of low birth weight babies. In 2004, 11.9% of babies born to smokers had low birth weight as compared to only 7.2% of babies born to nonsmokers. More specifically, infants born to smokers weigh on average 200 grams less than infants born to women who do not smoke.<sup>8</sup> Premature and low birth weight babies face an increased risk of serious health problems as newborns have chronic lifelong disabilities such as cerebral palsy (a set of motor conditions causing physical disabilities), mental retardation and learning problems. Overall, they also face an increased risk of death.<sup>9</sup>

Figure 3.10 shows the percentage of pregnant women with smoking status recorded, still smoking at time of delivery for Thurrock and its CIPFA comparator local authorities. As figure 3.10 shows, 10.79% of pregnant women in Thurrock are still smoking at time of deliver in 2009/10. Thurrock has the lowest prevalence of pregnant women smoking at time of delivery, when compared to its CIPFA comparator local authorities and lower than both the regional and national rates. We can conclude that Thurrock has a statistically significantly lower rate of smoking at time of delivery at 95% confidence compared to the East of England, England and all but three of its CIPFA comparator local authorities.

From a public health point of view, this is highly encouraging, although rates of smoking at time of delivery are likely to vary between different geographical areas of Thurrock and correlate with deprivation levels.



Source: http://www.apho.org.uk

Figure 3.10 shows the percentage of pregnant women who are smoking at time of delivery of their baby for Thurrock and its ONS comparator local authorities. As figure 3.10 shows, Thurrock has the lowest percentage of mothers smoking at time of delivery within its ONS comparator group, and a rate which is significantly lower than both the comparator group mean and the England and East of England rate. This is encouraging as it will have a positive impact on the health of both mothers and their new born babies.

#### 3.1.8 Summary and Recommendations

- Smoking is the leading preventable cause of death in England, and the biggest single cause of inequalities in death rates between rich and accounting for over half of the difference in risk of premature death between social classes
- Thurrock's overall adult smoking prevalence is significantly greater than both England's and the East of England but not statistically different to adult smoking prevalence amongst its CIPFA comparator group of local authorities.

- Smoking prevalence is not distributed evenly within Thurrock but largely linked to deprivation levels. The greatest prevalence of smoking is in Grays, Tilbury and St.Chads, Tibury Riverside and parts of Stanford East and Corringham Town.
- Thurrock has the lowest prevalence of pregnant women smoking at time of delivery compared to its CIPFA comparator local authorities and lower than both the regional and national rates.
- Rate of access to NHS commissioned stop smoking services per head of population generally increases with deprivation with deprived areas having a greater access rate than affluent areas. However when rate of access to stop smoking services is considered as a percentage of the estimated smoking population per ward, the picture is mixed with some deprived areas having high access rates and some having low access rates.
- Rate of quit success at four weeks through NHS stop smoking services per estimated smoking population of different wards does not correlate well to deprivation levels with some deprived areas such as Belhus having high quit rates per estimated smoking population and others low rates.
- In order to reduce health inequalities, commissioners should review commissioning arrangements of stop smoking services within Thurrock in order to increase access and quit rates per estimated smoking population in the deprived areas of West Thurrock and South Stifford, Grays Riverside, Tilbury St. Chads, Little Thurrock and Blackshots and Chadwell St. Mary

# **3.2 Eating Habits**

A person's weight is mainly influenced by the food they eat and the physical activity they do. One measure of a person's choices related to how healthy they eat is the number of fruit and vegetables they consume in a day. The recommended level is 5 or more pieces of fruit and vegetables each day. Poor diet and nutrition are recognised as major contributory risk factors for ill-health and premature death. The majority of people are still not eating the recommended daily consumption of five or more fruit and veg a day, although fruit and veg consumption is steadily increasing.

## 3.2.1 Prevalence of Healthy Eating



Estimated prevalence of adults who eat healthily, (males and females aged 16 and over) compared with the East of England, England and geographical neighbours.

Thurrock's estimated prevalence of people who eat healthily (24.77%) is significantly lower than the national average (28.65%) and the East of England average (30.32%). It is also lower than geographical neighbours of Basildon, Brentwood and the London borough of Havering.

Figure 3.11 below shows the estimated prevalence of adults aged over 16 years who eat healthily compared with CIPFA Nearest Neighbours.



Source: Association of Public Health Observatories: Estimates of Adults health and lifestyles. Health Survey for England 2006-08. <u>www.apho.org.uk</u>

Source: Association of Public Health Observatories: Estimates of Adults health and lifestyles. Health Survey for England 2006-08. <u>www.apho.org.uk</u>

Eating healthily is defined as eating 5 or more portions of fruit and vegetables a day where a portion is defined as an 80g serving. Figure 3.11 shows in Thurrock just under a quarter of adults eat the recommended 5+ portions of fruit or vegetables a day. Although this is a low percentage Thurrock is near the top of the range of CIPFA comparator local authorities which is a comparison group measured by the similarity between the authorities based upon a wide range of socio-economic indicators.

It is worth noting that these prevalences are modelled estimates based on individual level data from the Health Survey for England. Calculated by the National Centre for Social Research (NatCen) and is currently the most up to date data available.

Figure 3.12 below shows the percentage of People who eat healthily (defined as 5+ portions of fruit and vegetables a day)



Fig 3.12

Modelled estimates, based on individual-level data from the Health Survey for England 2006-2008. Source ERPHO.

The darker areas of blue show the areas where people eat the least healthily in Thurrock (Tilbury, Chadwell St. Mary and West Thurrock), the paler blue are the MSOA areas that eat the most healthily, such as North Stifford, Orsett and Bulphan.

This pattern of healthy eating appears to mirror the deprivation levels where the people living within the most deprived MSOA areas eat the least healthily.

#### 3.2.2 Healthy Eating and Deprivation

Figure 3.13 below shows the correlation between eating healthily and the level of deprivation within an MSOA area as shown by the IMD score (Index of multiple deprivation). Each blue triangle represents an MSOA in Thurrock.



Fig 3.13

Carrying out the Pearson product-moment correlation coefficient on the data used to produce the correlation graph gives a measure of the correlation (linear dependence) of two variables where the r value = 1 it denotes a perfect correlation and where r= 0 it denotes no correlation, where r=-1 it shows an inverse correlation. The r value for the data above is -0.832 which shows a significant inverse relationship between the two variables at the 0.05 level of probability, where the deprivation score increases the % of healthy eating adults decreases showing that those adults living in the most deprived areas eat significantly less healthily that those in less deprived areas. This highlights an important health inequality that requires a coordinated approach to tackle, looking at the availability of healthly options, looking at why people choose to eat the foods they do and to educate people as to the consequences of not eating a healthy diet and the negative impact it can have on their health. As mentioned in the introduction, eating healthily has the biggest impact on a person's weight which along with the level of physical activity will contribute to whether a person is a healthy weight, overweight or obese.

# **3.3 Alcohol and Substance Misuse**

### 3.3.1 Alcohol

Alcohol is a toxic substance for humans with both direct and indirect effects on the body and organs<sup>10</sup>. It is the world's third largest risk factor for disease and disability. Alcohol is a causal factor in 60 types of disease and injury and a component cause of 200 others; these include liver and kidney disease, acute and chronic pancreatitis, depression, hypertensive and cardiovascular disease<sup>11</sup>. It accounts for 9.2% of disability adjusted life years worldwide, 7.4% of ill-health and premature death in the European Union and 4% of worldwide deaths which is more than HIV/AIDS or tuberculosis.

However, alcohol plays an important role in the economy. It is estimated that Britons spent approximately £17 billion in pubs each year<sup>12</sup>. Approximately 4.5% of all consumer spending is on alcohol. In 2009/10, the UK government received £9 billion in revenue from alcohol sales; this is approximately 2% of the Government's total tax revenue<sup>13</sup>.

Alcohol also plays a central role in many social and family events, for example enhancing mealtimes, when meeting friends and on special occasions. Research shows that people drinking at moderate levels can have increased mental, physical and social wellbeing; lower levels of stress; and greater feelings of social connection<sup>14</sup>. The role of alcohol can change through the different stages of a person's life, as society's norms of drinking levels and drinking behaviour change<sup>15</sup>.

For the NHS it is estimated that the financial burden of Alcohol Use Disorders is around  $\pounds 2.7$  billion. This consists of hospital admissions, attendance at Accident & Emergency and primary care costs with the majority of these costs in hospital admissions. In addition to the cost of alcohol misuse on the healthcare systems, it is estimated the cost to the criminal justice system is about  $\pounds 7.3$  billion. Days lost to the economy for alcohol-related issues and absenteeism is calculated to be around  $\pounds 6.4$  billion. The cost to families, social networks and the impact of alcohol on households including homelessness and children affected by parental alcohol problems is unquantifiable<sup>16</sup>.

## 3.3.1.1 Hazardous, Harmful and Binge Drinking

Nationally, a fifth of the population in England report hazardous drinking during 2009/10. Figure 3.14 shows the comparison of Thurrock's rates of hazardous, harmful and binge drinking compared to the National and Regional rates. Hazardous drinking is defined as drinking above the recommended limits but not yet experiencing harm. Harmful drinking is drinking above the recommended limits and experiencing harm, such as alcohol-related accidents or health problems related to alcohol consumption including insomnia, hypertension or cirrhosis. Binge drinking is drinking over double the daily recommended level in one day (over eight units for men and over six units for women).



*Fig 3.14*: Estimated rates of Hazardous, Harmful and Binge Drinking of Thurrock residents compared to the England and East of England rates, 2010

The death, disease and injury caused by alcohol can be linked to economic status. People who are employed are more likely to drink more often than those who are unemployed and men and women in high income jobs are more likely to have a higher weekly consumption of alcohol. Also, the burden of disease linked to alcohol is moving to younger age groups for both men and women and to the most socially deprived<sup>17</sup>.

Source: Local Alcohol Profile, 2010

The lower the economic development or socioeconomic status of a country the higher the alcohol-related health problems. Also, the lower the socioeconomic status of an individual within that country, the higher the disease burden<sup>18</sup>. Those living in most deprived areas of the UK are two to three times more likely to die of alcohol-related causes, three to five times more likely to die from alcohol specific causes and two to five times more likely to be admitted to hospital due to alcohol than the most affluent<sup>19</sup>.

Around 12.1% of adult Thurrock residents currently engage in hazardous drinking at a lower rate of 12.1% than both England (20.8%) and East of England (16.8%).

However the pattern of consumption varies across the borough. Figure 3.15 illustrates the variances in the distribution of hazardous drinking within the borough. The pattern shows higher hazardous drinking in the more affluent wards, This is in line with the socioeconomic link to alcohol consumption discussed above, as those with higher income employment are likely to drink more during the week.

However, 5.1% residents in Thurrock are estimated to drink at a harmful level which is lower than the England (7.1%) but higher than the regional East of England (4.6%) rates. Figure 3.16 shows the variance in the levels of harmful drinking in Thurrock.



Fig 3.15: Hazardous Drinking by MSOA in Thurrock

#### Fig 3.16: Harmful Drinking patterns by MSOA in Thurrock



Thurrock has an estimated binge drinking rate of 20.9%. This is greater than the England (20.1%) and the East of England (18.2%) rate. Thurrock is ranked 180<sup>th</sup> out of 326 local authorities for binge drinking. Figure 3.17 compares Thurrock's rate with its geographical neighbours and the Chartered Institute of Public Finance and Accountancy (CIPFA) statistical neighbours. As the calculations for the levels of binge drinking are synthetic there is a wide confidence interval for the data. Although the confidence intervals for the data overlap, Thurrock's upper confidence interval is greater than both regional and national levels.



*Fig 3.17*: Synthetic estimates of the percentage of the population aged 16 years and over who engage in Binge Drinking 2010 compared to geographic neighbours

*Fig 3.18*: Synthetic estimates of the percentage of the population aged 16 years and over who engage in Binge Drinking 2010 compared to CIPFA Nearest Neighbours



A Directed Enhanced Service (DES) for Alcohol Related Risk Reduction was introduced in 2009 to encourage screening of newly registered patients for alcohol use. Patients registering with the GP over the age of 16 were to be screened using FAST, AUDIT C, or AUDIT PC. If this resulted in a positive screen, as outlined by the trigger points of the test, a full AUDIT would then be carried out. Figure 3.19 shows the performance of GP practices in Thurrock who signed up to the DES and are using the SytmOne computer software in 2010/11 financial year. The DES focused on newly registered patients, and clearly shows a wide variability in the performance.

There could be a limitation on this data due to the data collection process. The extraction of the data is dependent on accurate coding by GP practices. The 2010/11 DES did not give clear direction on the codes to use within SystmOne, so data was extracted using the read codes in the systems that were the ones that matched the enquiry.

In 2010/11, GP practices signed up the DES in Thurrock screened 29.7% of the newly registering patients. Further, only 11.4% received the full AUDIT screening and less than 0.5% is recorded as having been given brief intervention or referral to specialist services.



Fig 3.19: Performance of Thurrock GP practices who signed up to the DES

#### 3.3.1.2 Alcohol related Admissions

Alcohol related admissions to hospital are described as either alcohol specific or alcohol attributable. Alcohol specific admissions are where alcohol is a contributing factor in all cases, for example alcohol poisoning, alcoholic gastritis and alcoholic liver disease. Alcohol attributable admissions are measured using a calculation which includes 47 conditions that are wholly or partially attributed to alcohol for example hypertensive disease, acute and chronic pancreatitis and cardio vascular disease. Alcohol-specific admissions are a relative measure of the direct impact of alcohol on health and alcohol-attributable admissions are a measure of the impact of alcohol on public health.



Fig 3.20 : Alcohol Specific and Alcohol Attributable Admissions for Thurrock





#### 3.3.1.3 Alcohol Attributable Mortality

Nationally, Thurrock is ranked 77<sup>th</sup> for alcohol-attributable mortality for men at a rate of 34.2 per 100,000 population. The England rate is 37.1 per 100,000 and the East of England rate is 31.3 per 100,000. For alcohol attributable mortality for women, Thurrock is ranked 159<sup>th</sup> with a rate of 13.9 per 100,000 compared to the England rate of 15.3 per 100,000 population and the East of England rate of 12.8 per 1000,000. Figure 3.22 compares Thurrock's alcohol attributable mortality figures with its geographical and statistical neighbours. The trend for alcohol attributable mortality for men and women in Thurrock from 2005 to 2009 is illustrated in Figure 3.23. This clearly shows that the alcohol attributable mortality for both men and women is decreasing, from 42.1 per 100,000 population to 27.2 per 100,000 population for men and 15.3 per 100,000 population to 11.2 per 100,000 population for women. As the data sets for these indicators are small, the confidence intervals are larger than expected. Due to the large confidence intervals, the ranking comparison should only be used as a guide as the majority of the confidence intervals overlap.



Figure 3.22: Alcohol Attributable Mortality DSR per 100,000 population compared to geographical neighbours

Figure 3.23: Alcohol Attributable Mortality DSR per 100,000 population compared to CIPFA Nearest Neighbours Model





Figure 3.24: Trend in Alcohol Attributable Mortality, DSR per 100,000 population

Source: North West Public Health Observatory

#### 3.3.1.4 Alcohol Complexity index

The purpose of the alcohol complexity indicator is to provide an indication of the makeup of the treatment population according to the complexity level of the clients in treatment. It is intended as a guide to give a general impression of the complexity levels of the alcohol treatment population in each area.

This data covers all new adult primary alcohol clients entering treatment in 2010-11 excluding any clients with missing data and including latest treatment journeys for those having more than one treatment episode.

Complexity indicators cover other additional drug use, number of treatment journeys, housing, dual diagnosis, unemployment, Criminal Justice System, Accident and Emergency, clients with children, clients who are pregnant, other additional pre or post treatment journeys as primary drug clients.

Thurrock has more clients drinking at lower and medium and high levels and less at the highest level than the regional average and significantly less at highest levels than geographical neighbours, as shown in Figure 3.25 below.

It is noteworthy that there are no referrals into treatment services from A&E and Criminal Justice clients are recorded as having lower levels of units consumed per month.

Looking at individual numbers of complexity indicators per client, Thurrock has more clients on the medium and high complexity index levels than the national average, with around a third of the clients falling in the top two categories with the national average at around a quarter. This means that more Thurrock clients have complex and resource intensive needs than the national average





Source: National treatment Agency for Substance Misuse 2010-11

## 3.3.2 Illegal Drug Use

The health harms arising from licit and illicit substance use and misuse are wide-ranging and vary depending on the substance used and the pattern and context of their use, but it is well established that their use represents a major public health burden<sup>20</sup>.

Substance misuse has a major impact on the physical, psychological and social health and wellbeing of an individual and their families. Besides profound impairment and loss of physical health, people with alcohol and drug use disorders may suffer severely from psychological and psychosocial problems, interpersonal problems, loss of employment, difficulty in participating in education, and legal problems<sup>21</sup>. Substance misuse also impacts on society, from the crime in local neighbourhoods, through families forced apart by dependency, to the corrupting effect of international organised crime<sup>22</sup>.

A key driver for drug treatment is the 2010 Drug Strategy<sup>23</sup> which places recovery at the heart of service delivery. The Drug Strategy defines recovery as involving three overarching principles: wellbeing; citizenship and freedom from dependence. Within this concept is the need for drug users in the treatment system to build up their "recovery capital" that includes social capital (resources available from relationships with family, for instance); physical capital (such as money and a place to live); human capital (skills, mental or physical health and a job); cultural capital (values and beliefs). Alongside the movement towards recovery is the need to align services to outcomes measurements including freedom from dependence as a key metric.

The Coalition Government's 2010 Drug Strategy announced a significant shift in emphasis for England's drug treatment system. "Instead of focusing primarily on reducing the harms caused by drug misuse," it said, "our approach will be to go much further and offer every support for people to choose recovery as an achievable way out of dependency."

A recent report on Drug Treatment and Recovery 2010-11<sup>24</sup> highlights some significant successes including 96% of those wanting treatment had a wait of less than three weeks, those leaving drug treatment free from dependency increased by 150% and the number of 18-24yr olds entering treatment for crack/heroin halved in the last 5.

#### 3.3.2.1 Adult Drug Use

Figure 3.17 below shows how adult drug use in Thurrock compares with the rest of the East of England. For each indicator, the value for this area is shown as a coloured circle, while the regional range is shown as a bar. Please note that for some indicators even a green circle may imply the need for further improvement.

The spine chart displays the local value for each indicator compared with the lowest and highest value of all East of England Drug and Alcohol Action Teams (DAATs) and the average for the East of England. The '%Data Field Bank' column shows the proportion of data that was not reported by agencies to the National Drug Treatment Monitoring System (NDTMS); high proportions of blank or non-recorded data fields impact on the validity of the data.

Sig	nif	icantly worse than regional average	gnificantl	ent from reg	ional a	verage 💼	East aver	age	_				
<b>Sig</b>	nif	icantly better than regional average ONo sig	nificance	testing	Į		ELG	owest 25th percentile	75th percentile E	Highest	t		
Domain	Γ	Indicator	Local Number	Local Value	% Data Field Blank	East Avg	East Lowest	East Ra	ast Range				
	1	% Male	348	73.3%	0%	72.0%	70.0%		0		75.7%		
	2	% White ethnicity	436	93.2%	1%	93.1%	67.5%	] — — • •			96.8%		
8	3	% Aged 18-24	87	18.3%	0%	14.5%	<mark>11.2%</mark>			o	18.3%		
raph	4	% Aged 45+	54	11.4%	0%	13.9%	11.4%	0		•	18.5%		
four	5	% Parents	310	57.5%	3%	52.5%	48.6%			oГ	57.5%		
å	6	% With at least one child living with client	205	38.1%	3%	28.2%	17.4%		0		43.9%		
	7	% Housing problem	111	20.5%	3%	21.7%	14.6%				26.89		
	8	% Residents who think using or dealing drugs is a problem	n/a	39.3%	n/a	25.9%	22.3%				45.0%		
	9	% Opiates as primary drug	231	41.5%	0%	74.6%	41.5%	0			84.49		
esn	10	% Crack cocaine as primary drug	27	4.8%	0%	4.3%	1.7%		)		11.6%		
	11	% Alcohol as secondary or tertiary drug	188	33.8%	0%	19.0%	4.8%			0	33.89		
Brug	12	% Currently injecting	47	8.6%	2%	24.9%	8.6%	0		ĭΓ	36.89		
-	13	Prevalence of problem drug users aged 15-64	435	4.3	r/a	6.1	4.3	0			12.4		
	14	Prevalence of drug injectors aged 15-64	133	1.3	n/a	2.0	1.3	0			4.1		
	15	% Self referred	270	48.6%	0%	47.1%	30.7%				59.9%		
	16	% Referred from criminal justice system	119	21.4%	0%	22.8%	17.6%				27.3%		
men	17	Rate in treatment	475	4.5	n/a	3.7	2.9		0		9.3		
reat	18	% Unplanned exits	86	23.8%	n/a	37.0%	21.1%		_		51.7%		
F	19	% Problem drug users not in effective treatment	17	17.2%	r/a	16.9%	10.3%				20.5%		
	20	% All drugs (aged 18 and over) not in effective treatment	44	17.5%	n/a	19.5%	10.5%	0=			24.1%		
ime	21	Drug-related death rate	7	1.9	r∕a	2.6	1.6				7.4		
Itho	22	Hospital stays due to drugs	74	23.6	n/a	55.4	23.6	0			161.		
Hea	23	Drug offences per 1,000 persons	334	2.2	n/a	3.0	1.6				4.		

Fig 3.17: Spine Chart for Adult Drug Use in Thurrock

Source: ERPHO MUSE Drug Profile 2010

### The Adult Treatment Population

The National Treatment Agency National Drug Treatment Monitoring System (NDTMS) records Thurrock clients in treatment and Figure 3.18 below shows substance details of all clients in treatment from 2008 to 2011.





Source : Eastern NDTMS June 2011 Thurrock Repatriated Data for all substances, all clients

If this is compared to the National data for all clients in treatment it can be seen that in Figure 3.18, Thurrock has particularly high levels of alcohol misuse and equally significant issues with cannabis, opiates/crack, opiates and cocaine.

In Figure 3.19 the three equally key substances nationally are alcohol, opiates and opiates/crack shown in percentages for Thurrock and the East of England as a comparison.





Source: Eastern NDTMS June 2011 Repatriated Data for all substances for all clients in the Eastern Region

#### Numbers of drug users recorded as being in Effective Treatment

**Effective Treatment**: An individual is in effective treatment if they remain in treatment for 12 or more weeks or leave the treatment in a care-planned way within 12 weeks. **OCU**: Drug User who uses opiates and/or crack cocaine.

Figure 3.20

Thurrock	08/09	09/10	10/11
OCU's	207	211	224
All Drugs	426	437	391

As can be seen from Figure 3.20 numbers of OCUs have risen from 08/09 although numbers of adult clients misusing drugs of any description has fallen.

Figure 3.21 shows that although numbers of OCUs fluctuated, these were at their highest point at the end of the 2010-11 reporting period.

Figure 3.21



Figure 3.22 Below is a detailed breakdown of all Thurrock clients in treatment as at 31/03/2011

#### Figure 3.22

In treatment 31/03/2011

	Opiate &/or								Amphetamine		Cannabis		Benzodiazepine			
	Crack Users	%	Opiate Users	%	Crack Users	%	Cocaine Users	%	Users	%	Users	%	Users	%	Other Users	%
Gender																
Male	130	78	123	78	65	79	61	82	14	74	113	77	15	79	14	88
Female	37	22	34	22	17	21	13	18	5	26	33	23	4	21	2	13
Ethnic group																
White	151	91	142	91	77	94	67	91	17	89	140	<mark>96</mark>	19	100	15	94
Asian or Asian British	4	2	4	3	1	1	0	0	0	0	0	0	0	0	0	0
Black or Black British	3	2	3	2	2	2	1	1	0	0	0	0	0	0	0	0
Other	8	5	7	4	2	2	6	8	2	11	6	4	0	0	1	6
Age on 30th September 2010																
15-24 years	13	8	10	6	7	9	10	14	3	16	43	29	0	0	6	38
25-34 years	56	34	52	33	32	39	22	30	4	21	36	25	8	42	1	6
35-64 years	98	59	95	61	43	52	42	57	12	63	67	46	11	58	9	56
Injecting Status																
Current	43	26	43	27	26	32	12	16	1	5	23	16	5	26	2	13
Previous	47	28	46	29	24	29	10	14	5	26	16	11	8	42	3	19
Never	71	43	62	39	31	38	49	66	13	68	105	72	6	32	11	69
Not known	6	4	6	4	1	1	3	4	0	0	2	1	0	0	0	0
Total	167		157		82		74		19		146		19		16	

#### **Treatment Planned Exits**

Numbers of clients completing treatment having met their treatment goals through a care planned exit from treatment are counted as successfully completing treatment. Thurrock had the highest planned exit rate in the Eastern Region which was well above the national average.

Figure 3.23 : Treatment Planned Exit

Planned Exit Rate			
	2009	2010	2011
Thurrock	55%	53%	67%
National	40%	38%	43%

#### Annual year end Data taken from NDTMS.net

#### Drug Related Offences

Thurrock has seen a significant reduction of drug trafficking and a slight rise in drug possession and for all and for these measures is performing well compared to similar 'family' groupings.

Offence	No. of Crimes	% change against 09/10	Crimes / 1,000	MSF * crimes / 1,000	Ranked against MSF
All Drug Offences	465	0%	0.777	0.925	5th
Drug Trafficking	69	-17%	0.100	0.139	4th
Drug Possession	396	+3%	0.676	0.786	6th

Figure 3.24: Drug offences for 2010/11

\* MSF: most similar family where ranked 1 is best in family, 15<sup>th</sup> is worst

#### Drug Related Deaths

Thurrock has the lowest rate of Drug Related Death per 100,000 population in the Eastern Region and this is half the national average.

#### Figure 3.25

DAAT name	2001	2002	2003	2004	2005	2006	2007	2008	2009	Deaths 2007- 09	Average deaths 2007-09	Population aged 15+ mid-2007-09	Rate 100,000 population
Peterborough	7	5	7	3	2	6	12	11	5	28	9.33	405,960	6.90
Southend-on-Sea	11	8	10	5	11	6	11	8	7	26	8.67	401,881	6.47
Norfolk	27	23	17	33	31	25	41	26	29	96	32.00	2,141,820	4.48
Luton	8	8	4	7	8	4	3	7	3	13	4.33	453,232	2.87
Cambridgeshire	16	14	15	6	12	14	14	14	13	41	13.67	1,496,666	2.74
Bedfordshire	7	11	7	5	7	6	6	11	6	23	7.67	1,000,254	2.30
Suffolk	16	11	13	17	9	6	11	11	15	37	12.33	1,763,685	2.10
Hertfordshire	18	20	12	15	17	11	12	23	14	49	16.33	2,638,049	1.86
Essex	15	20	16	23	17	23	24	15	16	55	18.33	3,429,695	1.60
Thurrock	3	2	1	3	2	3	3	2		5	1.67	370,792	1.35
East of England	128	122	102	117	116	104	137	128	108	373	124.33	14,102,034	2.65

Source: MUSE, 2010

#### 3.3.2.2 Young People's Drug Use

The chart below shows how young people substance misuse in Thurrock compares with the rest of the East of England. For each indicator, the value for this area is shown as a coloured circle, while the regional range is shown as a bar. Please note that for some indicators even a green circle may imply the need for further improvement.

Figure 3.26 spine chart displays the local value for each indicator compared with the lowest and highest value of all East of England DAATs and the average for the East of England. The '% Data Field Blank' column shows the proportion of data that was not reported by agencies to NDTMS; high proportions of blank or non-recorded data fields impact on the validity of the data.

#### Figure 3.26: Spine Chart for Young People's Drug Use in Thurrock

Sign	ific	antly worse than regional average 🛛 🔵 No	ot significa	ntly differ	ent from reg	ional av	/erage	East average						
O Sign	ific	antly better than regional average	significar	nce testing	g		= 1	owest 25th percentile	75th percentile E					
Domain		Indicator	Local Number	Local Value	% Data Field Blank	East Avg	East Lowest	East	Range	East Highest				
(0	1	% Male	63	70.0%	0%	60.9%	39.1%		0	76.3%				
phics	2	% White ethnicity	88	98.9%	1%	91.6%	70.9%		0	98.9%				
ogral	3	% Aged 15 and under	35	38.9%	0%	43.5%	27.1%	0		57.1%				
Gem	4	% Not living with parents or relatives	12	13.2%	2%	23.0%	13.2%			55.4%				
	5	% Housing problem	<5	1.1%	2%	5.8%	1.1%			9.8%				
	6	% Alcohol as primary drug	25	26.9%	0%	35.5%	23.3%	0		66.0%				
	7	% Cannabis as primary drug	61	65.6%	0%	55.5%	25.5%		0	70.0%				
ø	8	% Opiates as primary drug	<5	3.2%	0%	2.5%	0.4%		0	4.1%				
e use	9	% Drug users currently injecting	<5	2.9%	0%	1.1%	0.0%			4.2%				
anci	10	Prevalence of problem drug users aged 15-24	77	4.0	n/a	5.5	3.8			9.6				
ubst	11	% Pupils been drunk at least once in last 4 weeks	225	17.0%	n/a	14.9%	11.0%		•	19.0%				
0)	12	2 % Pupils ever taken drugs	79	11.0%	n/a	8.8%	5.0%		•	11.0%				
	13	School exclusions for drug or alcohol	50	0.2%	n/a	0.1%	0.1%			0.2%				
	14	NI 115 Substance misuse by young people	164	12.4%	n/a	9.5%	7.7%			12.4%				
	15	% Self referred	9	9.7%	0%	10.5%	4.3%	0		15.0%				
+	16	% Referred from criminal justice system	52	55.9%	0%	39.3%	12.8%		0	65.0%				
men	17	% Referred from children and families services	22	23.7%	0%	34.8%	16.7%	0		54.7%				
reat	18	Rate in treatment	90	5.0	n/a	2.7	1.4		0	8.0				
F	19	) % Unplanned exits	28	45.9%	n/a	22.5%	11.4%			45.9%				
	20	) % Retained in treatment for less than 12 weeks	40	43.0%	n/a	31.8%	16.6%		0	44.0%				
alth	21	YP hospital stays due to alcohol	25	23.1	n/a	37.6	23.1			54.2				
Hee	22	YP hospital stays due to drugs	8	14.9	n/a	15.3	10.7			29.9				

Source: Muse 2011

#### Young People Treatment Population

The drug profile (primary, secondary or tertiary) of young people aged **less than 18 years** who have engaged with specialist treatment services in Thurrock is presented below in Figure 3.27. Although there has been some fluctuation in the actual numbers presenting for treatment (from 104 in 2007/8 to 90 in 2009/10), there are three main substances misused by young people in Thurrock – cannabis, alcohol and to a lesser extent, cocaine. Use of the most problematic drugs (opiates or crack-cocaine) has been reported at comparatively low rates.



Figure 3.27: Drug profiles of young people (under 18) recorded in treatment for Thurrock residents,

Source: Eastern NDTMS June 2011 Thurrock Repatriated Data based on all substances, clients > 18

The age profile of young people accessing treatment services in Thurrock is shown in Figure 3.28 below. It is shown in the risk categories used by the National Drug Treatment Monitoring System (NDTMS) to create risk matrix scores for young people in treatment. The mean age of young people in treatment is 15.35 years. The modal age is 16 years.

The concept of the ACCE (Alcohol, Amphetamines, Cannabis, Cocaine and Ecstasy) profile first proposed in May 2007, Parker (2007) claimed clear epidemiological evidence of fewer new young heroin users and an ageing heroin-crack using population. Parker coined the term ACCE profile, with the original acronym focusing on Alcohol, Cannabis, Cocaine and Ecstasy: the substances most identified for under-18s around 2006. He argued that "the critical issue with the ACCE profile is not that one substance is used in moderation but that a minority of younger people are using all four drugs in purposeful combinations". The basic proposition was that in many regions in England young people's services were primarily intervening with under-18s around alcohol, followed by cannabis, while ecstasy and cocaine problems rose inexorably. Fewer under-18s were presenting with primary opiate problems, and as the classic heroin-crack cocaine users get older they would be followed by a cohort of young people with the ACCE profile<sup>25</sup>.



Fig 3.28 : Age of Young People accessing Treatment in Thurrock by risk category 2010

The primary drug used by young people in Thurrock is cannabis, with the second being alcohol. The primary drug use identified in the National Drug treatment Monitoring System is illustrated in Figure 3.29 below. This shows drugs such as opiates and crack are currently the primary substances being misused in Thurrock. Therefore focus needs to be given to cannabis and alcohol prevention work with young people.

Source: NDTMS, 2011



Fig 3.29: Primary Drug Use of Young People in Thurrock

Source: NDTMS, 2011

#### **3.3.3 Summary and Recommendations**

The highest substance misused in Thurrock for both adults and young people is alcohol, followed by cannabis. While the level of adults drinking at hazardous levels is below regional and national average, the percentage drinking at harmful levels and those who are binge drinking is above national and regional levels. Admissions for alcohol attributable and alcohol specific illnesses are increasing and this trend mirrors the national picture.

The Directed Enhanced Service introduced by the Government for Alcohol Related Risk Reduction has a wide variance in performance and is not being used to provide the best impact on the alcohol consumption within Thurrock. More work is required to increase the impact of this Department of Health identified 'high impact' change, and to widen the screening and early interventions to people with illnesses that are resulting in admissions to hospital. There is also the potential to look wider than GP and health services in the provision of these services: schools, social workers and other professionals could be trained to provide screening and brief intervention programmes. The Thurrock Drug and Alcohol Action Team are showing good results in a number of areas against regional and national averages and in particular for numbers in effective treatment and planned treatment exits. However, more work is to meet the needs from the complex alcohol patients presenting for treatment.

There is also a need to focus on substance misuse in the young people of Thurrock, particularly as the levels of pupils being excluded from school due to alcohol or drugs, the percentage who were drunk in the last four weeks, and the percentage of young people who have ever taken drugs are significantly higher than the regional average.

# **3.4 Physical Activity**

Physical activity is an important part of a healthy lifestyle. The term "physical activity" should not be mistaken with "exercise". Exercise, is a subcategory of physical activity that is planned, structured, repetitive, and purposeful in the sense that the improvement or maintenance of one or more components of physical fitness is the objective. Physical activity includes exercise as well as other activities which involve bodily movement and are done as part of playing, working, active transportation, house chores and recreational activities<sup>26</sup>.

There are many health benefits from regular physical activity. For example, physical activity can reduce your risk of heart disease, stroke and high blood pressure; it can reduce pain from arthritis and lower the risk of osteoporosis; it can help to manage and prevent diabetes; and it can lower stress levels and improve mental wellbeing.

Disease and disability caused by physical inactivity cause serious and unnecessary human suffering and impaired quality of life. The estimated costs of physical inactivity in England are £8.2 billion annually, which does not include the contribution of inactivity to obesity which in itself has been estimated at £2.5 billion annually. These figures include both the costs to the NHS and costs related to the economy, such as absence from work<sup>27</sup>.

# 3.4.1 Physical Activity Levels

## 3.4.1.1 Children and Young People's Physical Activity Levels

Figure 3.30 shows the percentage of physically active children in Thurrock compared to our CIPFA comparators. 'Physically Active Children' are defined as those attending state school who participate in a minimum of three hours high quality PE or school sport per week. As figure 3.30 shows, Thurrock has relatively low levels of physical activity levels in children at school compared to its CIPFA comparators. Levels of physical activity are statistically significantly lower than 12 out of 15 CIPFA comparator local authorities and regional and national rates.





#### 3.4.1.2 Adult Physical Activity Levels

Adult participation from the *Active People Survey* is measured as the number of days of adult (16+) participation for at least 30 minutes moderate intensity over the last four weeks. From this the indicators of 5x30, 3x30, 2x30, 1x30, 1-3 days and 0x30 are derived. They are defined as follows:

5x30	=	5 times a week (or 20 or more days over the last 4 weeks)
3x30	=	3 times a week (or 12 -19 days over the last 4 weeks)
2x30	=	2 times a week (or 8-11 days over the last 4 weeks)
1x30	=	1 times a week (or 4-7 days over the last 4 weeks)
1-3 days	=	1-3 days over the last 4 weeks (so not 0x30 but not quite 1x30)
0x30	=	0 times a week (no 30 minute moderate intensity sessions)
3x30	=	3 or more times a week (or 12 or more days over the last 4 week)

It is recommended that adults participate in a minimum of three sessions of physical activity of at least 30 minutes long per week. (3x30). Table 3.18 shows adult (aged 16+) levels of physical activity for Thurrock, the East of England and England. Table 3.31 shows a breakdown of levels of physical activity in adults aged 16+ for males and females in Thurrock across age ranges.

Table 3.31	
------------	--

			Thurrock			England					
Indicator	Year	Thurrock	Thurrock	Thurrock	st of Englari	st of Englarist	of Englar	England	England	England	
		All	Male	Female	All	Male	Female	All	Male	Female	
0 days /	2005/06	56.9%	52.8%	60.7%	49.0%	45.0%	<b>52.8%</b>	50.0%	45.1%	54.6%	
0x30	2008/10	51.4%	44.9%	57.3%	47.4%	42.3%	52.3%	47.8%	42.3%	53.1%	
1.2 days	2005/06	8.7%	8.8%	8.5%	9.2%	9.8%	8.7%	8.8%	9.5%	8.1%	
I-5 days	2008/10	11. <mark>8%</mark>	13.8%	9.9%	9.5%	10.2%	8.8%	9.0%	9.7%	8.4%	
4-7 days /	2005/06	10.8%	12.0%	9.7%	12.5%	13.2%	11. <mark>8%</mark>	12.0%	12.8%	11.3%	
1x30	2008/10	12.1%	12.4%	11. <b>9%</b>	13.1%	13.9%	12. <b>4%</b>	12.6%	13.5%	11. <mark>8%</mark>	
8-11 days /	2005/06	6.7%	6.9%	6.4%	8.4%	9.1%	7.7%	8.0%	8.7%	7.3%	
2x30	2008/10	7.6%	8.2%	7.1%	8.6%	9.5%	7.7%	8.5%	9.4%	7.7%	
12-19 days	2005/06	7.4%	9.3%	*	9.5%	10.6%	8.4%	9.6%	10.9%	8.4%	
3x30	2008/10	9.1%	11.1%	7.1%	10.3%	11. <mark>8%</mark>	8.9%	10.7%	12.2%	9.2%	
12+ days /	2005/06	17.0%	19.6%	14.7%	20.8%	22.8%	18.9%	21.3%	24.0%	18.7%	
3x30 - NI8	2008/10	17.1%	20.6%	13.9%	21.3%	24.1%	18.7%	22.0%	25.1%	19.0%	
20+ days /	2005/06	9.7%	10.3%	9.1%	11.4%	12.3%	10.5%	11. <b>7%</b>	13.1%	10.3%	
5x30	2008/10	8.0%	9.5%	6.7%	11.0%	12.3%	9.9%	11.3%	12.9%	9.8%	
Source: Active People Survey, Year: 2005/06 (APS1), 2008/10 (APS3/4) or 2009/10 (APS4) if LA sample is boosted, Measure: Adult participation											

#### Table 3.32

Adult (16+) Participation in Sport and Active Recreation - at least 3x30 per week compared to nearest neighbours													
Indicator	Thurro	ck	Medw	/ay	Bury	/	Bolto	n	Swind	on			
Indicator	2005/06	2008/10	2005/06	2008/10	2005/06	2008/10	2005/06	2008/10	2005/06	2008/10			
Male	19.6%	20.6%	21.9%	21.1%	24.6%	28.2%	21.0%	23.8%	21.3%	27.6%			
Female	14.7%	13.9%	14.7%	14.1%	17.3%	1 <mark>8.6%</mark>	15.8%	20.9%	17.9%	1 <mark>8.8%</mark>			
16 to 19	*	30.6%	*	*	37.2%	40.4%	*	47.8%	*	*			
20 to 24	*	t	*	×	*	±	*	±	*	*			
25 to 29	*	25.2%	*	t	±	34.8%	*	*	*	*			
30 to 34	*	*	*	×	*	*	*	*	*	29.5%			
35 to 44	19.4%	18.2%	18.8%	*	25.7%	20.9%	19.8%	19.3%	21.2%	25.3%			
45 to 64	16.7%	14.2%	14.3%	15.6%	21.2%	21.6%	16.0%	1 <mark>8.3%</mark>	13.8%	21.0%			
65+	*	t	*	×	±	*	*	*	*	*			
White	17.5%	17.6%	18.3%	18.4%	21.3%	24.1%	17.9%	23.4%	19.2%	23.2%			
Non-White	*	*	*	*	*	*	*	*	*	*			
Limiting disat	*	t	*	×	*	×	*	±	*	*			
No limiting dis	18.3%	18. <b>4%</b>	18.8%	19.9%	23.0%	26.4%	21.1%	25.5%	22.1%	25.4%			
NS-SEC 1-2	21.2%	19.8%	21.5%	22.0%	24.0%	27.1%	23.5%	27.1%	25.5%	28.2%			
NS-SEC 3	*	20.8%	*	±	±	±	t	±	*	*			
NS-SEC 4	*	t	*	t	±	±	t	±	*	*			
NS-SEC 5-8	12.7%	13.4%	15.0%	12.9%	18.9%	19.9%	13. <b>4%</b>	15.3%	15.1%	18. <b>4%</b>			
Total	17.0%	17.1%	18.2%	17.5%	20.8%	23.3%	18.3%	22.3%	19.6%	23.2%			
Source: Activ	ve People Surv	ey, Year: 20	05/06 (APS1),	2008/10 (A	PS3/4) or 2009	/10 (APS4) i	if LA sample is	boosted, Me	asure: Adult p	articipation			

Table 3.32 shows the percentage of adults (aged 16+) participating in three or more 30 minute physical activity sessions per week in Thurrock, the East of England, and

England in 2005-6 and 2008-10. Figures 3.33 and 3.34 show this for males and females respectively.













As figures 3.33 - 3.35 show, physical activity rates in adults aged 16+ in Thurrock are lower than both the East of England and England in both males and females for 2005-6 and 2008-10. In addition physical activity rates in adult females has decreased significantly between 2005-6 and 2008-10.

Table 3.36 shows participation of adults in sports and active recreation by age and social class. Table 3.36 suggests that physical activity levels decrease with age, with the most inactive group being those aged 65 plus. The 2008-10 figures show that 76% of those aged 65+ had not undertaken any physical activity lasting more than 30 minutes in the last month.

#### Table 3.36

Indicator	Voor						Thur	ock					
Indicator	rear	All	16-19	20-24	25-29	30-34	35-44	45-64	65+	NS SEC 1-2	NS SEC 3	NS SEC 4	NS SEC 5-8
0 days /	2005/06	56.9%	*	*	46.8%	45.3%	48.1%	63.5%	86.3%	49.8%	53.2%	49.3%	65.1%
0x30	2008/10	51. <b>4%</b>	28.9%	33.0%	39.0%	43.3%	47.6%	55.0%	76.0%	44.5%	45.4%	43.8%	60.6%
1.2 days	2005/06	8.7%	*	t	t	t	t	t	*	t	*	t	9.3%
1-5 days	2008/10	11. <mark>8%</mark>	*	*	*	*	13.4%	10.4%	*	13.2%	t	t	8.5%
4-7 days /	2005/06	10.8%	t	t	*	t	17.0%	t	*	13.9%	t	t	8.6%
1x30	2008/10	12.1%	*	*	*	*	12.8%	11. <mark>8%</mark>	*	15.7%	t	t	11.2%
8-11 days /	2005/06	6.7%	*	t	*	t	t	t	*	t	*	t	t
2x30	2008/10	7.6%	*	*	*	*	t	8.9%	*	6.8%	*	*	6.2%
12-20 days	2005/06	7.4%	t	t	t	t	*	t	*	t	*	*	t
/ 3x30	2008/10	9.1%	*	*	*	*	9.6%	7.1%	*	12.5%	*	*	5.7%
12+ days /	2005/06	17.0%	*	*	*	*	19.4%	16.7%	*	21.2%	*	*	12.7%
3x30 - NI8	2008/10	17.1%	30.6%	*	25.2%	*	18.2%	14.2%	*	19.8%	20.8%	*	13.4%
20+ days /	2005/06	9.7%	*	t	*	t	t	t	*	11.0%	*	*	8.6%
5x30	2008/10	8.0%	*	*	t	*	*	7.1%	*	7.3%	*	*	7.7%

Adult (16+) Participation in Sport & Active Recreation (formerly NI8) by year, duration, age band and socio-economic class

Source: Active People Survey, Year: 2005/06 (APS1), 2008/10 (APS3/4) or 2009/10 (APS4) if LA sample is boosted, Measure: Adult participation

Figure 3.37 shows the expected and observed percentage of the Thurrock population participating in 3 or more 30 minutes physical activity sessions per week, compared with regional and England averages for 2005-6 and 2007-9. As figure 3.37 shows, Thurrock as a lower observed compared to expected level of physical activity. This level is also lower than regional and country averages and fell from 2005-6 to 2007-9.

Fig 3.37







Source: APHO LA Public Health Profiles 2011.

Figure 3.38 shows the percentage of adults in Thurrock who are physically active compared to our CIPFA comparator local authorities and regional and national rates. 'Physically active' is defined as '*Participation in moderate intensity sport and active recreation on 20 or more days in the previous 4 weeks*'. As figure 3.38 shows, Thurrock has the lowest percentage of adults who are physically active compared to its CIPFA local authorities, and a rate that is statistically significantly lower than three CIPFA comparators, England and the region.

#### 3.4.1.3 Participation in different sports.

Figure 3.39 shows participation of adults aged 16 plus in the five most popular sports in Thurrock, the East of England and England.



Fig 3.39

As figure 3.39 shows, swimming and football are the most popular and second most popular sports in Thurrock and have a greater percentages of adults participating in them compared to England and the East of England. Cycling has significantly lower levels of participation in Thurrock compared to regional or national rates.

#### 3.4.2 Local Leisure Provision

Figure 3.40 shows the total number of Leisure/Physical Activity facilities in Thurrock compared to our nearest neighbours. Figure 3.41 shows the number of different types of these facilities in Thurrock compared with our nearest neighbours. As Table 3.41 shows, the most common type of facility is a grass pitch (80) followed by a Sports Hall (28) and a Health and Fitness Suite (19).

As figure 3.40 and Table 3.41 show, the total number of facilities in Thurrock is lowest within the nearest neighbour grouping. Thurrock has a particularly low level of swimming pools and grass pitches compared to its nearest neighbours, facilities that are needed to allow our population to participate in the activities that are popular amongst them. i.e. swimming and football.



Fig 3.40

#### Table 3.41

Number of facilities compared with nearest neighbours

Facilities	Thurrock	Medway	Bury	Bolton	Swindon
	Number	Number	Number	Number	Number
Athletics Tracks	1	2	1	2	1
Golf	10	6	7	23	9
Grass Pitches	80	115	110	169	106
Health & Fitness Suite	19	21	19	31	28
Ice Rinks	0	1	0	0	1
Indoor Bowls	1	2	0	0	2
Indoor Tennis Centre	1	0	0	5	4
Ski Slopes	0	2	0	0	0
Sports Hall	28	49	29	39	43
Squash Courts	6	7	6	7	12
Swimming Pool	11	24	15	24	20
Artificial Grass Pitch	4	8	5	6	5
Total	161	237	192	306	231
Population (000s)	119.9	199.5	145.0	209.1	154.9

Source: Active Places Power, Year: Jan 2011, Measure: Number of sporting facilities, Population Data: ONS Annual Population Survey 2010

#### 3.4.2.1 Satisfaction with Local Leisure Provision

Figure 3.42 shows how satisfaction ratings of leisure provision for the population of Thurrock compared to regional and national ratings between 2005 and 2010.





As figure 3.42 shows, satisfaction with provision in Thurrock is well below both national and regional levels. Furthermore, whilst national and regional satisfaction has improved from 2007 year on year, satisfaction ratings for Thurrock have remained largely static. As a result, the 'satisfaction gap' between Thurrock and regional and national ratings of leisure services has increased significantly between 2005 and 2010.

Figure 3.43 shows the percentage of the population of Thurrock who are satisfied with local sports provision compared to Thurrock's nearest neighbours.



Fig 3.43

41.9% of Thurrock residents are satisfied with local leisure services provision. This figure is less than three of our 'nearest neighbour' local authorities but slightly greater than Medway's.

### 3.4.3 Summary and Recommendations

- Thurrock has low levels of physical activity in both adults and children. Levels of
  physical activity in children are statistically significantly lower than 12 out of our
  15 CIPFA comparators and regional and national rates. In adults, Thurrock has
  the lowest percentage of the population aged 16+ who are physically active
  compared to our CIPFA local authorities and rates that are statistically
  significantly lower than three of our CIPFA comparators and regional and
  national rates.
- Inactivity increases with each decade of age amongst our residents. Only 28.9% of 15 and 16 year olds participate in no physical activity, whilst this figure rises to 43.3% amongst the 30-34 year olds and 76% amongst those aged 65+.
- Physical activity is lower in females and males and in females, the percentage who participate in 3 or more 30 minute sessions of exercise per week fell between 2005-6 and 2008-10.
- Thurrock has the smallest number of local leisure facilities compared with our nearest neighbour grouping of local authorities. It has particularly low levels of swimming pools and grass pitches compared to our nearest neighbour local authorities which is concerning as these facilities are required if our population are going to participate in their two favourite forms of exercise; swimming and football.
- Levels of satisfaction with leisure provision in Thurrock are significantly lower than both England and regional rates, and have declined over the last five years. The percentage of our population who are satisfied with local leisure provision is also low compared to our nearest neighbour local authority comparators.
- Relatively low levels of both provision and satisfaction with local leisure services may be translating into low levels of physical activity amongst our population.
- Undertaking adequate levels of physical activity is a key factor of good health and is protective against a range of diseases including cardio-vascular disease and obesity. The Health and Wellbeing Strategy for Thurrock needs to prioritise commissioning actions to increase levels of physical activity amongst both adults and children and improve the provision and quality of local leisure services.

# 3.5 Breastfeeding

Breastfeeding has a major role to play in improving health and wellbeing as evidence shows it both promotes health and prevents disease in both the short and long term for infant and mother. As well as providing complete nutrition for the development of healthy infants, human breast milk is key in protection against gastroenteritis and respiratory infection<sup>28</sup>, prevention of middle ear infection<sup>29</sup>, prevention of urinary tract infection<sup>30</sup>, protection against atopic disease<sup>31</sup>, prevention of juvenile onset insulin-dependent diabetes mellitus,<sup>32</sup> protection against raised blood pressure and reduction in the risk of childhood obesity<sup>33</sup>.

Breastfeeding is also beneficial to the mother's health, with women who do not breastfeed being at significantly greater risk of developing epithelial ovarian cancer and breast cancer,<sup>34,</sup> compared to those who breastfed.

Despite the overwhelming health benefits of breastfeeding, initiation rates in the UK are around the lowest in Europe and worldwide, with rapid discontinuation of rates for those who do start. Initiation and duration rates of any breastfeeding are lowest among families from lower socio-economic groups adding to inequalities in health and contributing to the perpetuation of the cycle of deprivation. Initiation, and to a lesser degree, duration rates are particularly low among white women in the UK compared to women who are Asian, Black or mixed ethnicity.<sup>35,</sup> The influence of the community has also been shown to be important for breastfeeding practice, with white lone mothers being more likely to initiate and continue breast feeding if resident in areas with a predominantly ethnic minority community, indicating the importance of peer influence.

Teenage or young mothers have also been identified as a key target group, as they are half as likely as older mothers to initiate breast feeding<sup>36</sup>.

## 3.5.1. Breastfeeding initiation rates by ONS cluster 2009-2010

Breastfeeding initiation rates for Thurrock LA sit in 6<sup>th</sup> place out of 15 areas in its CIPFA comparator local authorities. This is depicted by figure 3.44 below:



Fig 3.44: The percentage of mothers initiating breastfeeding for Thurrock and its related CIPFA areas from 2009 to 2010

# 3.5.2. Breastfeeding 6-8 week check rates by Thurrock GP practice 2010-2011

Breastfeeding prevalence as recorded at the 6 - 8 week check, performed by local GPs, remains low across Thurrock. Recording of the feeding status is poor, and plans are ongoing to increase the coverage i.e. the recording of the feeding status, in turn increasing the prevalence of breastfeeding at 6 - 8 weeks. This is because where there is a lack of data recording (i.e. no feeding status), the Department of Health (DH) count these patients as bottle fed.

The DH statistics on prevalence of breastfeeding is a combination of mothers who describe their feeding status at 6 - 8 weeks as breastfeeding as well as breastfeeding with supplement (bottle feeding). In the data reporting, breastfeeding and breastfeeding with supplement are combined and compared with bottle feeding.

Figure 3.45 shows breast feeding prevalence at the 6-8 week check for patients registered at different Thurrock practices.

<sup>(</sup>Data source: http://www.apho.org.uk/resource/view.aspx?RID=105001)



Fig 3.45 Breastfeeding uptake at the 6 - 8 week check for Thurrock GPs from 2010 to 2011

(Data source: PCT database of SystmOne and non-systmone practice records)

Breast feeding prevalence at the 6-8 week check for mothers registered to Thurrock GPs, of which there are 36 in the area, is generally below that of the East of England, and England average as demonstrated in figure 3.45 above. It can be observed that for breastfeeding uptake at the 6 – 8 week check for 2010 to 2011, the average for Thurrock GPs was 20.71% breastfeeding, whereas the average for the East of England was 31% and for England 30.9%. The lower prevalence of breast feeding across Thurrock from these statistics is a product of both poor data recording and low uptake rates.

In figure 3.46 the data recording of Thurrock GPs in the area is observed to be improving due to changes implemented by Public Health in April 2011. By improving the coverage of the data being captured, prevalence figures have increased.



Fig 3.46 Breastfeeding status at 6-8 weeks recording (coding) for Quarter 1 2011

(Data source: PCT database of SystmOne and non-systmone practice records)

The recording of the breastfeeding status at the 6 - 8 week check by GPs can be seen to increase dramatically from April 2011 through to the end of the first quarter. A large amount of work was carried out by the Public Health, Child Health and Health Visiting teams to increase the recording coverage to 95% so that accurate breastfeeding data could be analysed.





(Data source: PCT database of SystmOne and non-systmone practice records)

As Figure 3.47 depicts, the increase in data coverage increased the cases of breastfeeding having been recorded for Quarter 1, and this, in conjunction with strengthened commissioning arrangements with health providers to increase the focus on breast feeding, has increased breast feeding prevalence for Thurrock.



Fig 3.48 The percentage of mother breastfeeding by MSOA for Thurrock 2010 to 2011

(Data source: PCT database)

The percentage of mothers breastfeeding is demonstrated above in Figure 3.48 by MSOA (Medium Super Output Area) for the year 2010 - 2011. Most MSOAs lie between 19.6% and 49.01% of the bandings, with West Thurrock having the highest area of breastfeeding prevalence in Thurrock.

### 3.5.3 Breastfeeding trend data

*Fig 3.49:* Feeding intention as recorded at delivery trend data for Thurrock, England and the East of England from 2008 to 2011



(http://www.apho.org.uk/)

As demonstrated by figure 3.49 Thurrock breastfeeding initiation as recorded at birth performs below the England and the East of England average. The England and East of England averages remain similar through the trend period.

In summary it has been demonstrated that the Thurrock area has significant challenges to address in regards to breastfeeding initiation, data recording and continuing prevalence of breastfeeding at the 6 to 8 week check.

Initiation of breastfeeding data shows an average performance in relation to the CIPFA comparators, and performance below England and the East of England. Investment in maternity, health-visiting and GP services therefore requires attention to increase the skills and knowledge base that these services provide to mothers at key stages of their pregnancy and parenthood. By being able to provide the support and information at these stages, an increase in mothers choosing to breastfeed should be attained.

Secondly a programme of retraining GPs and Health Visitors so data is captured and recorded correctly should help create and maintain a robust dataset from which to draw upon, and in turn increase the prevalence of breastfeeding being recorded.

A general programme<sup>37</sup> also needs to run in conjunction with more specialised training to increase all HCWs and clerical staff's knowledge and skills when working or interacting with mothers, so that at any stage of the patients care a sound and clear breastfeeding message is maintained.

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